

Diageo plc (DEO) Long Term: 6-12 Months Zacks Recommendation: Neutral (Since: 10/05/20) \$160.47 (As of 11/16/20) Prior Recommendation: Underperform Price Target (6-12 Months): \$169.00 3-Hold Zacks Rank: (1-5) Short Term: 1-3 Months VGM:B Zacks Style Scores: Value: C Growth: A Momentum: D

Summary

Diageo has outpaced the industry year to date despite the pandemic-related headwinds. With easing of lockdowns across the globe, the company is witnessing a gradual recovery in on-trade volumes from bars and restaurants. As a result, it predicts sequential improvements in organic net sales, volume and operating profit in the first half of fiscal 2021. It also plans to increase marketing investment as demand recovers. Moreover, it is relentlessly working to leverage its existing e-commerce capabilities and accelerate investments in the online platform to cater to the pandemic-driven shift in consumer shopping behavior. However, it reported top and bottom line declines in fiscal 2020 due to pandemic related disruptions in the second half of fiscal 2020, which more than offset its consistently strong results in the first half.

Data Overview

P/S TTM

52-Week High-Low	\$171.29 - \$100.52
20-Day Average Volume (Shares)	674,256
Market Cap	\$102.8 B
Year-To-Date Price Change	-4.7%
Beta	0.55
Dividend / Dividend Yield	\$4.36 / 2.7%
Industry	Beverages - Alcohol
Zacks Industry Rank	Top 28% (70 out of 254)

Last EPS Surprise	NA
Last Sales Surprise	NA
EPS F1 Estimate 4-Week Change	1.6%
Expected Report Date	NA
Earnings ESP	0.0%
P/E TTM	NA
P/E F1	28.3
PEG F1	3.7

Price, Consensus & Surprise



Sales and EPS Growth Rates (Y/Y %)



Sales Estimates (millions of \$)

	Q1	Q2	Q3	Q4	Annual*
2022					16,165 E
2021					15,210 E
2020					14,817 A

EPS Estimates

	Q1	Q2	Q3	Q4	Annual*
2022					\$6.49 E
2021					\$5.68 E
2020					\$5.50 A
*Quarterly fi	igures may not a	idd up to annua	l.		

The data in the charts and tables, including the Zacks Consensus EPS and Sales estimates, is as of 11/16/2020. The reports text is as of 11/17/2020.

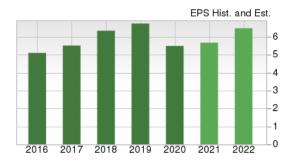
NA

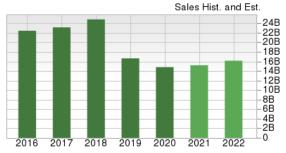
Overview

London-based Diageo plc operates in approximately 180 countries and is involved in producing, distilling, brewing, bottling, packaging as well as distributing spirits, wine and beer. The company offers its products under globally recognized flagship brands, such as Smirnoff, Johnnie Walker, Captain Morgan, Baileys, Buchanan's, J&B, Tanqueray and Guinness. Among these, 14 brands – Johnnie Walker, Smirnoff, Baileys, Crown Royal, Captain Morgan, Jose Cuervo, JeB, Buchanan's, Windsor, Ketel One vodka, Cîroc, Tanqueray, Bushmills and Guinness – are classified as global strategic brands.

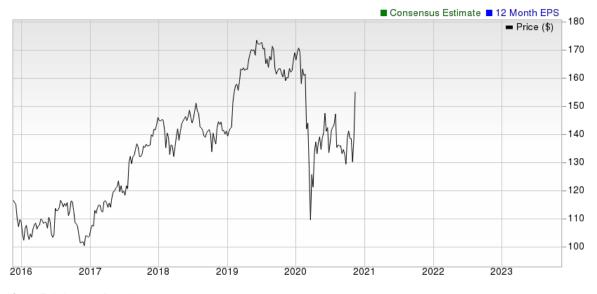
The company operates through five regions:—

- North America includes four operating units U.S. Spirits, Diageo-Guinness USA, Diageo Chateau & Estate Wines Co. and Diageo Canada.
- Europe comprises Great Britain, Ireland, Iberia, France, Germany, Benelux, Italy, Nordics, Greece, Switzerland, Austria, the Western European reserve brands, Diageo Guinness Continental Europe, European wines and the Western European operations of Global Travel. Western Europe.
- Africa is one of the oldest and largest markets for the Guinness brand. The company operates either through subsidiaries or under license.





- Latin America and the Caribbean region, which includes Mexico, Diageo distributes mainly through a mixture of Diageo companies and third-party distributors. In addition, Diageo owns a controlling interest in Desnoes & Geddes Limited, the Jamaican brewer of Red Stripe lager.
- Asia Pacific includes operations in India, China, Australia, New Zealand, South Korea, Japan, Thailand, Vietnam, Singapore, Malaysia and other Asian markets.



Source: Zacks Investment Research

Zacks Equity Research www.zackspro.com Page 2 of 13

Reasons To Buy:

▲ 1H21 Reflects Sequential Growth: Although shares of Diageo fell 4.7% year to date, it fared better than the industry's 9.3% decline. Diageo announced that its fiscal 2021 performance is off to a good start. The gradual reopening of the on-trade channels, including bars and restaurants across majority of the company's markets coupled with solid off-trade demand and sturdy execution, have been tailwinds. Management cited that it has witnessed sequential growth across all regions, with the U.S. business surpassing expectations on resilient consumer demand and robust spirits category. Overall, it is witnessing positive impact of the measures it made to recover on-trade. The company has been using consumer insights and marketing effectiveness equipment to make prudent investments in the areas of innovation, ecommerce and new opportunities like at-home occasions.

Diageo is relentlessly working to leverage its existing e-commerce capabilities and accelerate investments in the online platform to cater to the lockdowns-driven shift in consumer shopping behavior.

Management projects first-half fiscal 2021 organic net sales and operating profit to improve sequentially from second-half fiscal 2020. However, it continues to anticipate lower organic net sales and margin dilution in comparison to the year-ago period.

- ▲ North America Performance Aid Price/mix in FY20: Diageo delivered a positive price mix of 2.8% in fiscal 2020, which partly offset the decline in organic volume. Price/mix benefited from a strong market mix, with resilience in North America, which is its most profitable segment. Notably, net sales for the company's U.S. Spirits business improved 2.2% in fiscal 2020. Strong growth of 6.1% in the first half of fiscal 2020 was only partially offset by lower on-trade sales in the second half. This was attributed to the strong demand in the off-trade channel during the COVID-19 lockdown in the United States. Consequently, U.S. Spirits volumes were down 0.7% in fiscal 2020, while price/mix rose 2.9% primarily driven by strong growth in tequila and Canadian whisky brands.
- ▲ Digital Investments Aid Amid COVID-19: Diageo is relentlessly working to leverage its existing e-commerce capabilities and accelerate investments in the online platform to cater to the lockdowns-driven shift in consumer shopping behavior. The online platforms have become more relevant amid the coronavirus pandemic as consumers were confined to their homes. The company has diverted its efforts to connect with consumers and maintain brand relevance, by responding to increased opportunities of at-home consumption occasions. This included new occasion like wanting to enjoy bar-quality drinks at home. Further, the company has inspired consumers with cocktail recipes, new serves and ways to enjoy its brands with food. It also rapidly responded to increased demand for home delivery. In the United States and Latin America, it reached customers with new "cocktail to go' programs. In East Africa, the company explored new ways to get products delivered at consumers' homes, through partnerships with motorbike delivery companies, known as boda-bodas.
- ▲ Financial Status: Despite the impacts of the pandemic on its operating profit, Diageo managed to deliver strong operating cash flow and free cash flow in fiscal 2020. It generated net cash from operating activities of £2.3 billion, which reflected a decline of £0.9 billion from last year. Furthermore, the company reported free cash flow of about £1.6 billion in fiscal 2020, down £1 billion from the last year. To stay afloat amid the pandemic and manage finances, the company earlier halted its ongoing three-year return of capital program as well as shareholder returns. In the first seven months of fiscal 2020, through January, it returned £1.25 billion to shareholders through its return of capital program. Moreover, the company announced a recommended final dividend for fiscal 2020, which brings the full year dividend growth to 2%. Further, to reinforce its already solid liquidity, it issued a £2.0-billion bond in April 2020 and put in place an additional credit facility of £2.5 billion.

Reasons To Sell:

▼ Soft Second Half Performance FY20 Results: Diageo reported dismal fiscal 2020 results with 16% year over year decline in earnings per share (in local currency) and 8.7% fall in net sales. Additionally, operating profit fell 47.1% in the fiscal owing to organic declines. The company's performance in fiscal 2020 was hurt by the significant challenges related to the coronavirus outbreak in the second half, which more than offset the consistently strong results in the first half. Notably, the coronavirus related impacts led organic net revenues and operating profit to register declines of 8.4% and 14.4%, respectively, which affected the bottom line. Although organic sales benefited from top-line gains in North America, this was more than offset by declines across all other regions. Driven by the significant uncertainty over the pace and the shape of the recovery owing to the pandemic, the company did not provide specific guidance for fiscal 2021.

Diageo's performance in fiscal 2020 was hurt by the significant challenges related to the coronavirus outbreak in the second half, which more than offset the consistently strong first half results.

- ▼ On-Trade and Global Travel Disruptions Hurt Volume: Diageo's organic volumes dipped 11.2% in fiscal 2020. While the company delivered strong volume growth across all regions in the first half, volume in the second half of fiscal 2020 was largely impacted by the coronavirus outbreak. The volume declines in the second half were primarily due to the widespread closure of bars and restaurants around the world (on-trade channel) and the disruption to global travel. Notably, the on-trade segment, which is the sale of alcoholic beverages in licensed premises, accounts for nearly 40-50% of Diageo's revenues. Though trends in the on-trade channel are picking up due to reopening of restaurants and bars, it expects restrictions on travel retail continue hurting volume in the near term.
- ▼ Dismal Margins: Diageo's margin performance was significantly hurt by continued pressures from cost inflation as well as lower volume, thanks to the pandemic. Notably, the company's gross margin contracted 174 basis points (bps) in fiscal 2020, hurt by inflation in cost of goods sold (COGS), slightly negative product mix and lower volume with reduced fixed cost absorption. This was only slightly negated by productivity-led gross margin gains. During fiscal 2020, the company witnessed inflationary pressures from commodity costs, including base neutral spirits in India and agave as well as glass globally. Further, Organic operating margin contracted 212 basis points (bps) in fiscal 2020, owing to soft gross margin and costs arising from the disruptions in the operating environment, partially negated by overhead efficiencies and lower marketing spend in the fiscal fourth quarter. Notably, the company witnessed the peak of pandemic-related impacts on organic operating margin in the fourth quarter of fiscal 2020 owing to significant volume declines. Operating margin in included more than 10 percentage points of the aforesaid impacts, witnessed in the fourth quarter.
- ▼ Higher Taxes May Hurt Performance: The beer and beverage industry remains susceptible to unfavorable changes in taxes. In many regions, these taxes constitute a major chunk of the cost of beer that is charged to customers. Thus, any rise in excise taxes or indirect taxes on Diageo's products is likely to shift consumers' preferences to other beverages and weigh upon the overall consumption of the company's products, thus hurting its revenues and margins. Consequently, adverse taxation amendments remain a hurdle for the company's profitability.
- ▼ Macroeconomic Concerns: Diageo's customers remain sensitive to macroeconomic factors including interest rate hikes, increase in fuel and energy costs, credit availability, unemployment levels, and high household debt levels, which may negatively impact their discretionary spending, and in turn the company's growth and profitability.

Zacks Equity Research www.zackspro.com Page 4 of 13

Last Earnings Report

Diageo FY20 Earnings & Revenues Reflect Coronavirus Woes

Diageo reported preliminary fiscal 2020 results, ending Jun 30, 2020, wherein pre-exceptional earnings per share fell 16% year over year (in local currency). This was mainly driven by a decline in organic operating profit due to the impacts of the coronavirus outbreak. The company's performance in fiscal 2020 was hurt by the significant challenges related to the coronavirus outbreak in the second half, which more than offset the consistently strong results in the first half.

Moreover, it notes that the lockdowns across the globe have eased, with the return of the on-trade
channel, which includes bars and restaurants, in some regions. This has led to a gradual recovery

in on-trade volumes. However, restrictions on travel retail continue, which is likely to mar results in the near term. Driven by the significant uncertainty over the pace and the shape of the recovery owing to the pandemic, the company did not provide specific guidance for fiscal 2021.

Quarter Ending

Report Date

Sales Surprise

EPS Surprise

Quarterly EPS

Annual EPS (TTM)

06/2020

NA

NA

NA

NA

Aug 04, 2020

Nonetheless, it expects organic net revenues to witness sequential gains in the first and second quarters of fiscal 2021 as the on-trade channel further reopens and consumer demand begins to recover. Despite these gains, it expects the results for the first half of 2021 to reflect significant impacts of the pandemic. Although the company predicts sequential volume growth in the first half, it continues to anticipate significant COVID-related impacts and margin dilution compared with the robust performance in the first half of fiscal 2020.

Additionally, the company expects operating margin to improve sequentially in the first half of fiscal 2021 compared with the peak of the pandemic impact experienced in the fourth quarter due to significant volume declines. Notably, operating margin in the fourth quarter of fiscal 2020 was impacted by more than 10 percentage points. Additionally, the company plans to increase marketing investment as demand recovers. Overall, it anticipates sequential improvement in operating margin in the first half of fiscal 2021 as compared with the second half of fiscal 2020.

Fiscal 2020 Highlights

On a reported basis, net sales and operating profit declined 8.7% and 47.1%, respectively, owing to organic declines. During fiscal 2020, organic sales declined 8.4% as top-line gains in North America were more than offset by declines across all regions.

Notably, organic volumes dipped 11.2%. While the company delivered strong volume growth across all regions in the first half, volume in the second half of fiscal 2020 was largely impacted by the coronavirus outbreak. The volume declines in the second half were primarily due to the widespread closure of bars and restaurants around the world (on-trade channel) and the disruption to global travel.

However, the company delivered a positive price mix of 2.8% in fiscal 2020, which partly offset the decline in organic volume. Price/mix benefited from a strong market mix, with resilience in North America, which is its most profitable segment. However, volume declines across all other regions partly offset growth in the price/mix.

Gross margin contracted 174 basis points (bps) in fiscal 2020, hurt by inflation in cost of goods sold (COGS), slightly negative product mix and lower volume with reduced fixed cost absorption. This was only slightly negated by productivity-led gross margin gains. During fiscal 2020, the company witnessed inflationary pressures from commodity costs, including base neutral spirits in India and agave as well as glass globally.

Moreover, organic operating profit was down 14.4% on soft volumes, cost inflation and unabsorbed fixed costs, partly negated by short-term cost reductions and ongoing productivity benefits. Organic operating margin contracted 212 basis points (bps) in fiscal 2020, owing to soft gross margin and costs arising from the disruptions in the operating environment, partially negated by overhead efficiencies and lower marketing spend in the fiscal fourth quarter.

Financials

Diageo generated net cash from operating activities of £2.3 billion in fiscal 2020, which reflected a decline from the last year due to lower organic operating profit, lower dividends from associates, one-off tax impacts and increased working capital use. Furthermore, the company reported free cash flow of about £1.6 billion in fiscal 2020, down £1 billion from the last year.

Notably, the company delivered solid free cash flow of about £1 billion in the first half of fiscal 2020, which was only slightly enhanced by its second-half performance due to operating profit declines related to the Covid-19 pandemic.

Driven by the impacts of the pandemic, the company halted the current three-year return of capital program. In the first seven months of fiscal 2020, through January, it returned £1.25 billion to shareholders through its return of capital program. Further, to reinforce its already solid liquidity, it issued a £2.0-billion bond in April 2020 and put in place an additional credit facility of £2.5 billion.

Zacks Equity Research www.zackspro.com Page 5 of 13

Recent News

Diageo Recalls Guinness Stout - Nov 11, 2020

Diageo plc's Guinness has recalled its recently launched Guinness 0.0 drink in Great Britain due to microbiological contamination, per media reports. Guinness 0.0, which was launched nearly two weeks ago, is a non-alcoholic beer from the St. James's Gate brewers with a smooth taste and balanced flavor in dark color of Guinness.

Per media reports, management had warned consumers that the Guinness 0.0 cans' contents were unsafe to consume. These cans had taken nearly four years to develop and the contamination might have probably occurred in the production process at its St. James's Gate brewery. Currently, tests are being conducted to find out the cause and further production is at a halt. These reports also suggest that consumers who have bought these cans are instructed not to drink, and instead return the cans, thus being eligible for the entire refund. The company also looks to remove this product from the supermarkets and other shops.

We note that Guinness has a long history of innovation and brewing brilliance since 1759. The Guinness 0.0 at the St. James's Gate brewers uses the same natural ingredients— water, barley, hops and yeast. They remove the alcohol via a cold-filtration process which filters alcohol without thermal stress to the beer, thus guarding the integrity of taste and character. Then the brewers balance the flavors to give a unique flavor profile and Guinness' taste attributes. However, other variants and brands of Guinness are unaffected.

Diageo intends to Acquire Chase Distillery - Oct 26, 2020

Diageo has announced a deal to acquire Chase Distillery which is anticipated to be completed in early 2021 and is subjected to customary closing conditions. Post the acquisition, the company will add flavored gins including Pink Grapefruit & Pomelo, Seville Marmalade and Rhubarb & Bramley Apple Gin along with Williams Elegant 48 Gin to its already existing portfolio.

Diageo Concludes Buyout of Aviation Gin and Davos Brands - Sep 30, 2020

Diageo has successfully completed the acquisition of Aviation Gin and Davos Brands. This move is in sync with the company's plans to expand its super-premium gin segment across the United States with the addition of Astral Tequila, Sombra Mezcal and TYKU Sake to its already strong portfolio.

Diageo Cheers With Improving Alcohol Sales in 1H21 - Sep 28, 2020

Diageo announced that its fiscal 2021 performance is off to a good start. The gradual reopening of the on-trade channels, including bars and restaurants across majority of the company's markets coupled with solid off-trade demand and sturdy execution, have been tailwinds.

Management further cited that it has witnessed sequential growth across all regions, with the U.S. business surpassing expectations on resilient consumer demand and robust spirits category. In the United States, higher retailer confidence is aiding the off-trade channel, while the on-trade channel remains open in all the states involving certain capacity restrictions. In Europe, the company is experiencing robust off-trade demand whereas the on-trade channel has now reopened on easing of lockdowns across most countries.

While the on-trade channel has been recovering in China, the return of larger banqueting occasions is happening at a slower pace. Moreover, the on-trade channel has also started reopening in Africa, India, Latin America and the Caribbean. However, Diageo forecasts the speed of recovery in these markets to be more gradual. Furthermore, the travel retail remains severely affected. Overall, Diageo is witnessing positive impact of the measures it made to recover on-trade. The company has been using consumer insights and marketing effectiveness equipment to make prudent investments in the areas of innovation, e-commerce and new opportunities like at-home occasions.

All said, management projects first-half fiscal 2021 organic net sales and operating profit to improve sequentially from second-half fiscal 2020. However, it continues to anticipate lower organic net sales and margin dilution in comparison to the year-ago period.

Valuation

Diageo shares are down 4.7% in the year-to-date period and nearly 0.1% over the trailing 12-month period. Stocks in the Zacks sub-industry and the Zacks Consumer Staples sector are down 9.3% and 1.4% in the year-to-date period, respectively. Over the past year, the Zacks sub-industry is down 4.5% but the sector is up 2%.

The S&P 500 index is up 11.7% in the year-to-date period and 15.3% in the past year.

The stock is currently trading at 26.79X forward 12-month earnings, which compares to 26.19X for the Zacks sub-industry, 20.03X for the Zacks sector and 22.54X for the S&P 500 index.

Over the past five years, the stock has traded as high as 26.79X and as low as 14.61X, with a 5-year median of 21.11X. Our Neutral recommendation indicates that the stock will perform in line with the market. Our \$169.00 price target reflects 28.21X forward 12-month earnings.

The table below shows summary valuation data for DEO

Valuation Multiples - DEO
Stock Sub-Industry Sector S&P 500

	Current	26.79	26.19	20.03	22.54
P/E F12M	5-Year High	26.79	27.51	22.37	23.47
	5-Year Low	14.61	18.78	16.61	15.27
	5-Year Median	21.11	23.63	19.56	17.72
	Current	6.6	19.23	9.84	4.2
P/S F12M	5-Year High	6.95	20.68	11.16	4.3
	5-Year Low	3.51	13.06	8.14	3.17
	5-Year Median	5.16	17.2	9.89	3.67
	Current	18.45	46.44	39.18	15.98
EV/EBITDA TTM	5-Year High	23.12	55.01	45.71	15.98
	5-Year Low	14.43	28.34	27.69	9.54
	5-Year Median	18.96	44.48	39	13.1

As of 11/16/2020

Source: Zacks Investment Research

Industry Analysis Zacks Industry Rank: Top 28% (70 out of 254)

■ Industry Price 180 550 - Industry Price 170 160 500 150 140 130 400 120 350 110 100 300 2018 2019 2020 2017

Source: Zacks Investment Research

Top Peers

Company (Ticker)	Rec Rank
BrownForman Corporation (BF.B)	Outperform 2
Ambev S.A. (ABEV)	Neutral 3
AnheuserBusch InBev SANV (BUD)	Neutral 3
Carlsberg AS (CABGY)	Neutral 2
Constellation Brands Inc (STZ)	Neutral 3
Molson Coors Beverage Company (TAP)	Neutral 2
Tsingtao Brewery Co. (TSGTY)	Neutral 2
Pernod Ricard SA (PDRDY)	Underperform 5

The positions listed should not be deemed a recommendation to buy, hold or sell.

	noid of Sell.					
Industry Comparison Industry	/: Beverages - Al	cohol		Industry Peers		
	DEO	X Industry	S&P 500	ABEV	BUD	TAF
Zacks Recommendation (Long Term)	Neutral	-	-	Neutral	Neutral	Neutra
Zacks Rank (Short Term)	3	-	-	3	3	2
VGM Score	В	-	-	C	E	С
Market Cap	102.78 B	13.14 B	26.18 B	45.14 B	137.12 B	18.23 E
# of Analysts	4	1.5	13.5	2	3	6
Dividend Yield	2.72%	0.00%	1.48%	3.58%	1.23%	0.00%
Value Score	С	-	-	В	С	В
Cash/Price	0.04	0.04	0.06	0.10	0.00	0.04
EV/EBITDA	20.28	10.56	14.59	7.28	6.09	15.08
PEG F1	3.70	5.00	2.77	5.00	19.13	2.82
P/B	9.66	3.24	3.62	3.05	2.01	1.32
P/CF	18.63	18.28	13.69	10.66	10.76	5.23
P/E F1	27.93	30.71	22.23	28.70	30.22	10.51
P/S TTM	NA	2.38	2.88	3.84	2.89	1.51
Earnings Yield	3.54%	3.22%	4.32%	3.48%	3.31%	9.53%
Debt/Equity	1.80	0.52	0.70	0.03	NA	0.52
Cash Flow (\$/share)	8.61	1.59	6.92	0.27	6.32	8.59
Growth Score	Α	-	-	С	F	D
Historical EPS Growth (3-5 Years)	NA%	7.14%	9.77%	-7.94%	-10.88%	7.31%
Projected EPS Growth (F1/F0)	3.32%	3.18%	0.37%	-47.37%	-44.85%	-5.84%
Current Cash Flow Growth	20.52%	-0.66%	5.34%	2.72%	11.61%	-5.29%
Historical Cash Flow Growth (3-5 Years)	4.91%	4.16%	8.33%	-4.65%	0.84%	11.28%
Current Ratio	1.77	1.81	1.38	1.29	1.17	0.61
Debt/Capital	64.27%	35.86%	41.97%	3.09%	60.81%	34.10%
Net Margin	NA%	8.35%	10.40%	16.33%	-1.57%	4.86%
Return on Equity	NA%	9.55%	15.07%	13.86%	6.84%	7.35%
Sales/Assets	NA	0.49	0.50	0.48	0.41	0.42
Projected Sales Growth (F1/F0)	2.65%	0.00%	0.23%	-23.29%	-12.31%	-7.08%
Momentum Score	D	-	-	F	D	D
Daily Price Change	3.47%	0.93%	1.84%	2.50%	2.47%	1.77%
1-Week Price Change	12.01%	6.54%	4.29%	12.90%	17.08%	15.19%
4-Week Price Change	17.77%	9.32%	7.73%	21.10%	22.46%	29.38%
12-Week Price Change	16.11%	11.23%	10.59%	23.18%	18.59%	18.15%
52-Week Price Change	-0.04%	0.66%	6.85%	-30.51%	-15.05%	-13.55%
20-Day Average Volume (Shares)	674,256	33,621	2,197,472	29,265,562	2,393,552	3,080,847
EPS F1 Estimate 1-Week Change	1.56%	0.00%	0.00%	0.00%	0.00%	0.00%
EPS F1 Estimate 4-Week Change	1.56%	1.56%	1.77%	0.00%	17.80%	16.59%
EPS F1 Estimate 12-Week Change	4.94%	4.94%	3.73%	0.00%	3.69%	16.38%
EPS Q1 Estimate Monthly Change	NA%	0.48%	0.63%	-20.00%	20.24%	14.15%

Source: Zacks Investment Research

Zacks Stock Rating System

We offer two rating systems that take into account investors' holding horizons: Zacks Rank and Zacks Recommendation. Each provides valuable insights into the future profitability of the stock and can be used separately or in combination with each other depending on your investment style.

Zacks Recommendation

The Zacks Recommendation aims to predict performance over the next 6 to 12 months. The foundation for the quantitatively determined Zacks Recommendation is trends in the company's estimate revisions and earnings outlook. The Zacks Recommendation is broken down into 3 Levels; Outperform, Neutral and Underperform. Unlike many Wall Street firms, we maintain a balance between the number of Outperform and Neutral recommendations. Our team of 70 analysts are fully versed in the benefits of earnings estimate revisions and how that is harnessed through the Zacks quantitative rating system. But we have given our analysts the ability to override the Zacks Recommendation for the 1200 stocks that they follow. The reason for the analyst over-rides is that there are often factors such as valuation, industry conditions and management effectiveness that a trained investment professional can spot better than a quantitative model.

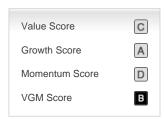
Zacks Rank

The Zacks Rank is our short-term rating system that is most effective over the one- to three-month holding horizon. The underlying driver for the quantitatively-determined Zacks Rank is the same as the Zacks Recommendation, and reflects trends in earnings estimate revisions.

Zacks Style Scores

The Zacks Style Score is as a complementary indicator to the Zacks rating system, giving investors a way to focus on the highest rated stocks that best fit their own stock picking preferences.

Academic research has proven that stocks with the best Value, Growth and Momentum characteristics outperform the market. The Zacks Style Scores rate stocks on each of these individual styles and assigns a rating of A, B, C, D and F. We also produce the VGM Score (V for Value, G for Growth and M for Momentum), which combines the weighted average of the individual Style Scores into one score. This is perfectly suited for those who want their stocks to have the best scores across the board.



As an investor, you want to buy stocks with the highest probability of success. That means buying stocks with a Zacks Recommendation of Outperform, which also has a Style Score of an A or a B.

Disclosures

This report contains independent commentary to be used for informational purposes only. The analysts contributing to this report do not hold any shares of this stock. The analysts contributing to this report do not serve on the board of the company that issued this stock. The EPS and revenue forecasts are the Zacks Consensus estimates, unless indicated otherwise on the reports first page. Additionally, the analysts contributing to this report certify that the views expressed herein accurately reflect the analysts personal views as to the subject securities and issuers. ZIR certifies that no part of the analysts compensation was, is, or will be, directly or indirectly, related to the specific recommendation or views expressed by the analyst in the report.

Additional information on the securities mentioned in this report is available upon request. This report is based on data obtained from sources we believe to be reliable, but is not guaranteed as to accuracy and does not purport to be complete. Any opinions expressed herein are subject to change.

ZIR is not an investment advisor and the report should not be construed as advice designed to meet the particular investment needs of any investor. Prior to making any investment decision, you are advised to consult with your broker, investment advisor, or other appropriate tax or financial professional to determine the suitability of any investment. This report and others like it are published regularly and not in response to episodic market activity or events affecting the securities industry.

This report is not to be construed as an offer or the solicitation of an offer to buy or sell the securities herein mentioned. ZIR or its officers, employees or customers may have a position long or short in the securities mentioned and buy or sell the securities from time to time. ZIR is not a broker-dealer. ZIR may enter into arms-length agreements with broker-dealers to provide this research to their clients. Zacks and its staff are not involved in investment banking activities for the stock issuer covered in this report.

ZIR uses the following rating system for the securities it covers. **Outperform-** ZIR expects that the subject company will outperform the broader U.S. equities markets over the next six to twelve months. **Neutral-** ZIR expects that the company will perform in line with the broader U.S. equities markets over the next six to twelve months. **Underperform-** ZIR expects the company will underperform the broader U.S. equities markets over the next six to twelve months.

No part of this report can be reprinted, republished or transmitted electronically without the prior written authorization of ZIR.

Zacks Equity Research www.zackspro.com Page 9 of 13

Additional Disclosure

This material represents an assessment of the market and economic environment at a specific point in time and is not intended to be a forecast of future events, or a guarantee of future results. Forward-looking statements are subject to certain risks and uncertainties. Any statements that refer to expectations, projections or characterizations of future events or circumstances, including any underlying assumptions, are forwardlooking statements. Actual results, performance, or achievements may differ materially from those expressed or implied.

Returns quoted represent past performance which is no guarantee of future results. Investment returns and principal value will fluctuate so that when shares are redeemed, they may be worth more or less than their original cost. Current performance may be higher or lower than the performance shown.

Investing involves risk; principal loss is possible. There is no guarantee that companies that can issue dividends will declare, continue to pay or increase dividends.

Glossary of Terms and Definitions

52-Week High-Low: The range of the highest and lowest prices at which a stock has traded during the past year. This range is determined based on the stock's daily closing price which may differ from the intra-day high or low. Many investors use it as a technical indicator to determine a stock's current value and future price movement. The idea here is that if price breaks out from the 52-week range, in either direction, the momentum may continue in the same direction.

20-Day Average Volume (Shares): The average number of shares of a company traded in a day over the last 20 days. It is a direct indication of a security's overall liquidity. The higher the average daily trading volume, the easier it is to enter or exit the stock at a desired price with more buyers and sellers being available.

Daily Price Change: This is the percentage difference between a trading day's closing price and the prior trading day's closing price. This item is updated at 9 p.m. EST each day.

1-Week Price Change: This is the percentage change in a stock's closing price over the last 5 trading days. This change reflects the collective buying and selling sentiment over the 1-week period.

A strong weekly price increase for the stock, especially when accompanied by increased volume, is an indication of it gaining momentum.

4-Week Price Change: This is the percentage change in a stock's closing price over the last 20 trading days or past 4 weeks. This is a mediumterm price change metric and an indication of the stock gaining momentum.

12-Week Price Change: This is the percentage change of a stock's closing price over the last 60 trading days or past 12 weeks. Similar to 4week price change, this is a medium-term price change metric. It shows whether a stock has been enjoying strong investor demand, or if it has been in consolidation, or distress over this period.

52-Week Price Change: This is the percentage change in a stock's closing price over the last 260 trading days or past 52 weeks. This longterm price change metric is a good reference point for investors. Some investors seek stocks with the best percentage price change over the last 52 weeks, expecting the momentum to continue.

Market Cap: The number of outstanding common shares of a company times its latest price per share. This figure represents a company's size, which indicates various characteristics, including price stability and risk, in which investors could be interested.

Year-To-Date Price Change: Change in a stock's daily closing price in the period of time beginning the first day of the current calendar year through to the previous trading day.

of Analysts: Number of EPS estimates used in calculating the current-quarter consensus. These estimates come from the brokerage analysts tracking this stock. However, the number of such analysts tracking this stock may not match the number of estimates, as all brokerage analysts may not come up with an estimate or provide it to us.

Beta: A measure of risk commonly used to compare the volatility of a stock to the overall market. The S&P 500 Index is the base for calculating beta and carries a value of 1. A stock with beta below 1 is less risky than the market as a whole. And a stock with beta above 1 is riskier.

Dividend: The portion of earnings a company is expected to distribute to its common shareholders in the next 12 months for each share they own. Dividends are usually paid quarterly. Dividend payments reflect positively on a company and help maintain investors' trust. Investors typically find dividend-paying stocks appealing because the dividend adds to any market price appreciation to result in higher return on investment (ROI). Moreover, a steady or increasing dividend payment provides investors a cushion in a down market.

Dividend Yield: The ratio of a company's annual dividend to its share price. The annual dividend used in the ratio is calculated based on the mostrecent dividend paid by the company. Dividend yield is an estimate of the dividend-only return from a stock in the next 12 months. Since dividend itself doesn't change frequently, dividend yield usually changes with a stock's price movement. As a result, often an unusually high dividend yield is a result of weak stock price.

S&P 500 Index: The Standard & Poor's 500 (S&P 500) Index is an unmanaged group of securities considered to be representative of the stock market in general. It is a market-capitalization-weighted index of stocks of the 500 largest U.S. companies. Each stock's weight in the index is proportionate to its market value.

Industry: One of the 250+ groups that Zacks classifies all stocks into based on the nature of business. These groups are termed as expanded (aka "X") industries and map to their respective (economic) sectors; Zacks has 16 sectors.

Zacks Industry Rank: The Zacks Industry Rank is determined by calculating the average Zacks Rank for all stocks in the industry and then assigning an ordinal rank to it. For example, an industry with an average Zacks Rank of 1.6 is better than an industry with an average Zacks Rank of 2.3. So, the industry with the better average Zacks Rank would get a better Zacks Industry Rank. If an industry has the best average Zacks Rank, it would be considered the top industry (1 out of 250+), which would place it at the top 1% of Zacks-ranked industries. Studies have shown that roughly half of a stock's price movement can be attributed to the industry group it belongs to. In fact, the top 50% of Zacks-ranked industries outperforms the bottom 50% by a factor of more than 2 to 1.

Last EPS Surprise: The percentage deviation of a company's last reported earnings per share from the Zacks Consensus Estimate. Companies with a positive earnings surprise are more likely to surprise again in the future (or miss again if they recently missed).

Last Sales Surprise: The percentage deviation of a company's last reported sales from the Zacks Consensus Estimate.

Expected Report Date: This is an estimated date of a company's next earnings release. The information originated or gathered by Zacks Investment Research from its information providers or publicly available sources is the basis of this estimate.

Earnings ESP: The Zacks Earnings ESP compares the Most Accurate Estimate to the Zacks Consensus Estimate for the yet-to-be reported quarter. The Most Accurate Estimate is the most recent version of the Zacks Consensus EPS Estimate. The idea here is that analysts revising their estimates closer to an earnings release have the latest information, which could potentially be more accurate than what they and others contributing to the consensus had predicted earlier. Thus, a positive or negative Earnings ESP reading theoretically indicates the likely deviation of the actual earnings from the consensus estimate. However, the model's predictive power is significant for positive ESP readings only. A positive Earnings ESP is a strong predictor of an earnings beat, particularly when combined with a Zacks Rank #1 (Strong Buy), #2 (Buy) or #3 (Hold). Our research shows that stocks with this combination produce a positive surprise nearly 70% of the time.

Periods:

TTM: Trailing 12 months. Using TTM figures is an effective way of analyzing the most-recent financial data in an annualized format that helps neutralize the effects of seasonality and other quarter-to-quarter variation.

F1: Current fiscal year. This period is used to analyze the estimates for the ongoing full fiscal year.

F2: Next fiscal year. This period is used to analyze the estimates for the next full fiscal year.

F12M: Forward 12 months. Using F12M figures is an effective way of analyzing the near-term (the following four unreported quarters) estimates in an annualized manner. Instead of typically representing estimates for the full fiscal year, which may not represent the nitty-gritty of each quarter, F12M figures suggest an all-inclusive annualized estimate for the following four quarters. The annualization helps neutralize the potential effects of seasonality and other quarter-to-quarter variations.

P/E Ratio: The price-to-earnings ratio measures a company's current market price per share relative to its earnings per share (EPS). Usually, the trailing-12-month (TTM) EPS, current-fiscal-year (F1) EPS estimate, or forward-12-month (F12M) EPS estimate is used as the denominator. In essence, this ratio shows what the market is willing to pay today for each dollar of EPS. In other words, this ratio gives a sense of what the relative value of the company is at the already reported level of earnings or at a future level of earnings.

It is one of the most widely-used multiples for determining the value of a company and helps comparing its valuation with that of a competitor, the industry group or a benchmark.

PEG Ratio: The price/earnings to growth ratio is a stock's P/E ratio using current fiscal year (F1) EPS estimate divided by its expected EPS growth rate over the coming 3 to 5 years. This ratio essentially determines a stock's value by factoring in the company's expected earnings growth and is thus believed to provide a more complete picture than just the P/E ratio, particularly for faster-growing companies.

P/S Ratio: The price-to-sales ratio is calculated as a company's current price per share divided by trailing 12 months (TTM) sales or revenues per share. This ratio shows what the market is willing to pay today for each dollar of TTM sales per share. The P/S ratio is at times the only valuation metric when the company has yet to become profitable.

Cash/Price Ratio: The cash-to-price ratio or Cash Yield is calculated as cash and marketable securities per share divided by the company's current share price. Like the earnings yield, which shows the anticipated yield (or return) on a stock from earnings for each dollar invested, the cash yield does the same, with cash being the source of return instead of earnings. For example, a cash/price ratio of 0.08 suggests a return of 8% or 8 cents for every \$1 investment.

EV/EBITDA Ratio: The EV/EBITDA ratio, also known as Enterprise Multiple, is calculated as a company's enterprise value (market capitalization + value of total long-term debt + book value of preferred shares - cash and marketable securities) divided by EBITDA (earnings before interest, taxes, depreciation and amortization). Usually, trailing-12-month (TTM) or forward-12-month (F12M) EBITDA is used as the denominator.

EV/Sales Ratio: The enterprise value-to-sales ratio is calculated as a company's enterprise value (market capitalization + value of total long-term debt + book value of preferred shares - cash and marketable securities) divided by annual sales. It is an expansion of the P/S valuation, which uses market value instead of enterprise value. The EV/Sales ratio is perceived as more accurate than P/S, in part, because the market capitalization does not take a company's debt into account when valuing it.

EV/CF Ratio: The enterprise value-to-cash flow ratio is calculated as a company's enterprise value (market capitalization + value of total longterm debt + book value of preferred shares - cash and marketable securities) divided by the trailing-12-month (TTM) operating cash flow. It's a measure of how long it would take to buy the entire business if you were able to use all the company's operating cash flow.

The EV/CF ratio is perceived as more accurate than the P/CF ratio, in part, because the market price does not take a company's debt into account when valuing it.

EV/FCF Ratio: The enterprise value-to-free cash flow metric compares a company's enterprise value to its trailing-12-month (TTM) free cash flow (FCF). This metric is very similar to the EV/CF ratio, but is considered a more exact measure owing to the fact that it uses free cash flow, which subtracts capital expenditures (CAPEX) from a company's total operating cash flow, thereby reflecting the actual cash flow available for funding growth activities and payments to shareholders.

P/EBITDA Ratio: The P/EBITDA ratio is calculated as a company's per share market value divided by EBITDA (earnings before interest, taxes, depreciation, and amortization). This metric is very similar to the EV/EBITDA ratio, but is considered a little less exact measure as it uses market price, which does not take a company's debt into account. However, since EBITDA is often considered a proxy for cash income, the metric is used as a measure of what the market is willing to pay today for each dollar of the company's cash profitability in the trailing 12 months (TTM) or forward 12 months (F12M).

P/B Ratio: The price-to-book ratio is calculated as a company's current price per share divided by its book value (total assets – liabilities – preferred stocks) per share. In short, the book value is how much a company is worth. In other words, it reflects the total value of a company's assets that its common shareholders would receive if it were to be liquidated. So, the P/B ratio indicates whether you're paying higher or lower than what would remain if the company went bankrupt immediately. Investors typically use this metric to determine how a company's stock price stacks up to its intrinsic value.

P/TB Ratio: The price-to-tangible-book value ratio is calculated as a the per share market value of a company divided by the value of its tangible assets (total assets – liabilities – preferred stocks – intangible assets) per share. Tangible book value is the same thing as book value except it excludes the value of intangible assets to get a step closer to the baseline value of the company.

P/CF Ratio: The price-to-cash flow ratio measures a company's per share market price relative to its trailing-12-month (TTM) operating cash flow per share. This metric is used to determine whether a company is undervalued or overvalued relative to another stock, industry or sector. And like the P/E ratio, a lower number is typically considered better from the value perspective.

One of the reasons why P/CF ratio is often preferred over P/E ratio is the fact that operating cash flow adds back non-cash expenses such as depreciation and amortization to net income. This feature helps valuing stocks that have positive cash flow but are not profitable because of large noncash charges.

P/FCF Ratio: The price-to-free cash flow ratio is an extension of P/CF ratio, which uses trailing-12-month (TTM) free cash flow per share instead of operating cash flow per share. This metric is considered a more exact measure than P/CF ratio, as free cash flow subtracts capital expenditures (CAPEX) from a company's total operating cash flow, thereby reflecting the actual cash flow available for funding activities that generate additional revenues.

Earnings Yield: The earnings yield is calculated as current fiscal year (F1) EPS estimate divided by the company's current share price. The ratio, which is the inverse of the P/E ratio, measures the anticipated yield (or return) from earnings for each dollar invested in a stock today.

For example, earnings yield for a stock, which is trading at \$35 and expected to earn \$3 per share in the current fiscal year (F1), would be 0.0857 (3/35 = 0.0857) or 8.57%. In other words, for \$1 invested in the stock today, the yield from earnings is anticipated to be 8.57 cents.

Investors most commonly compare the earnings yield of a stock to that of a broad market index (such as the S&P 500) and prevailing interest rates, such as the current 10-year Treasury yield. Since bonds and stocks compete for investors' dollars, stock investors typically demand a higher yield for the extra risk they assume compared to investors of U.S. Treasury-backed securities that offer virtually risk-free returns. This additional return is referred to as the risk premium.

Debt/Equity Ratio: The debt-to-equity ratio is calculated as a company's total liabilities divided by its shareholder equity. This metric is used to gauge a company's financial leverage. In other words, it is a measure of the degree to which a company is financing its operations through debt versus its own funds. The higher the ratio, the higher the risk for shareholders.

However, this ratio is difficult to compare across industry groups where ideal amounts of debt vary. Some businesses are more capital intensive than others and typically require higher debt to finance their operations. So, a company's debt-to-equity ratio should be compared with other companies in the same industry.

Cash Flow (\$/share): Cash flow per share is calculated as operating cash flow (after-tax earnings + depreciation + other non-cash charges) divided by common shares outstanding. It is used by many investors as a measure of a company's financial strength. Since cash flow per share takes into consideration a company's ability to generate cash by adding back non-cash expenses, it is regarded by some as a more accurate measure of a company's financial situation than earnings per share, which could be artificially deflated.

Current Ratio: The current ratio or liquidity ratio is a company's current assets divided by its current liabilities. It measures a company's ability to pay short-term obligations. A current ratio that is in line with the industry average or slightly higher is generally considered acceptable. A current ratio that is lower than the industry average would indicate a higher risk of distress or default. A higher number is usually better. However, a very high current ratio compared to the industry average could be an indication of inefficient use of assets by management.

Debt/Capital Ratio: Debt-to-capital ratio is a company's total debt (interest-bearing debt + both short- and long-term liabilities) divided its total capital (interest-bearing debt + shareholders' equity). It is a measure of a company's financial leverage. All else being equal, the higher the debt-to-capital ratio, the riskier the stock.

However, this ratio can vary widely from industry to industry, the ideal amount of required debt being different. Some businesses are more capital intensive than others and typically require higher debt to finance their operations. So, a company's debt-to-capital ratio should be compared with the same for its industry.

Zacks Equity Research www.zackspro.com Page 12 of 13

Net Margin: Net margin is calculated as net income divided by sales. It shows how much of each dollar in sales generated by a company translates into profit. For example, if a company's net margin is 15%, its net income is 15 cents for every \$1 of sales it makes.

A change in margin can reflect either a change in business conditions, or a company's cost controls, or both. If a company's expenses are growing faster than sales, its net margin will decline. However, different net margin rates are considered good for different industries, so it's better to compare net margin rates of companies in the same industry group.

Return on Equity: Return on equity (ROE) is calculated as trailing-12-month net income divided by trailing-12-month average shareholder equity (including reinvested earnings). This metric is considered a measure of how effectively management is using a company's assets to generate profits. For example, if a company's ROE is 10%, it creates 10 cents profits for every \$1 shareholder equity, which is basically the company's assets minus debt. A company's ROE deemed good or bad depends on what's normal for its peers or industry group.

Sales/Assets Ratio: The sales-to-assets ratio or asset utilization ratio or asset turnover ratio is calculated as a company's annual sales divided by average assets (average of assets at the beginning of the year and at the year's end). This metric helps investors understand how effectively a company is using its assets to generate sales. For example, a sales-to-assets ratio of 2.5 indicates that the company generated \$2.50 in sales for every \$1 of assets on its books.

The higher the sales-to-assets ratio, the better the company is performing. However, similar to many other ratios, the asset turnover ratio tends to be higher for companies in certain industries/sectors than in others. So, a company's sales-to-assets ratio should be compared with the same for its industry/sector.

Historical EPS Growth (3-5 Years): This is the average annual (trailing-12-month) EPS growth rate over the last 3-5 years. This metric helps investors see how a company's EPS has grown from a long-term perspective.

Note: There are many factors that can influence short-term numbers — a recession will reduce this number, while a recovery will inflate it. The longterm perspective helps smooth out short-term events.

Projected EPS Growth (F1/F0): This is the estimated EPS growth rate for the current financial year. It is calculated as the consensus estimate for the current fiscal year (F1) divided by the reported EPS for the last completed fiscal year (F0).

Current Cash Flow Growth: It measures the latest year-over-year change in operating cash flow. Cash flow growth tells an investor how quickly a company is generating inflows of cash from operations. A positive change in the cash flow is desired and shows that more 'cash' is coming in than going out.

Historical Cash Flow Growth (3-5 Years): This is the annualized change in cash flow over the last 3-5 years. The change in a longer period helps put the current reading into proper perspective. By looking at the rate, rather than the actual dollar value, the comparison across the industry and peers becomes easier.

Projected Sales Growth (F1/F0): This metric looks at the estimated sales growth for the current year. It is calculated as sales estimate for the current fiscal year (F1) divided by the reported sales for the last completed fiscal year (F0).

Like EPS growth, a higher rate is better for sales growth. A look at a company's projected sales growth instantly tells you what the outlook is for their products and services. However, different sales growth rates are considered good for different industries, so it's better to compare sales growth rates of companies in the same industry group.

EPS F1 Estimate 1-Week Change: The percentage change in the Zacks Consensus EPS estimate for the current fiscal year over the past week. The change in a company's consensus EPS estimate (or earnings estimate revision) has proven to be strongly correlated with the near-term price movement of its shares. It is an integral part of the Zacks Rank.

If a stock's consensus EPS estimate is \$1.10 now versus \$1.00 a week ago, that will be reflected as a 10% upward revision. If, on the other hand, it went from \$1.00 to 90 cents, that would be a 10% downward revision.

EPS F1 Estimate 4-Week Change: The percentage change in the Zacks Consensus EPS estimate for the current fiscal year over the past four weeks.

A stock's earnings estimate revision in a 1-week period is important. But it's more meaningful to look at the longer-term revision. And, of course, the 4-week change helps put the 1-week change into proper perspective.

EPS F1 Estimate 12-Week Change: The percentage change in the Zacks Consensus EPS estimate for the current fiscal year over the past 12 weeks

This metric essentially shows how the consensus EPS estimate has changed over a period longer than 1 week or 4 weeks.

EPS Q1 Estimate Monthly Change: The percentage change in the Zacks Consensus EPS estimate for the current fiscal quarter over the past four weeks

While the revision in consensus EPS estimate for the current fiscal year is strongly correlated with the near-term price movement of its shares, the estimate revision for the current fiscal quarter is an important metric as well, especially over the short term, and particularly as a stock approaches its earnings date. If a stock's Q1 EPS estimate decreases ahead of its earnings release, it's usually a negative sign, whereas an increase is a positive sign.